



# UNITED STATES PATENT AND TRADEMARK OFFICE

RD

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/071,786	02/07/2002	Carroll Diaz	A01280US	3588
22920	7590	04/04/2005		
GARVEY SMITH NEHRBASS & DOODY, LLC THREE LAKEWAY CENTER 3838 NORTH CAUSEWAY BLVD., SUITE 3290 METAIRIE, LA 70002			EXAMINER REESE, DAVID C	
			ART UNIT	PAPER NUMBER
			3677	

DATE MAILED: 04/04/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

## Office Action Summary

Application No.

10/071,786

Applicant(s)

DIAZ, CARROLL

Examiner

David C. Reese

Art Unit

3677

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on Amendment: 02 February 2005.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-20 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-20 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- |  |   |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)   | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                                   | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

### **DETAILED ACTION**

This office action is in response to Applicant's amendment filed 2/2/2005.

#### ***Status of Claims***

[1] Claims 1-20 are now pending, since in addition to the original 1-10, another (new) 11-20 claims are presented in the amendment filed 2/2/2005.

#### ***Claim Objections***

[2] Applicant has not addressed all objections to the Claims from the previous office action dated 11/2/2004, in the amendment filed 2/2/2005. Accordingly, the Examiner has not withdrawn the objections to the claims.

#### ***Response to Arguments***

[3] Applicant's arguments filed 2/2/2005 regarding rejections under 35 U.S.C. 102 have been fully considered but they are not persuasive. Beginning with Claim 1, applicant argues that Francesco does not disclose an elongated body having a bore wherein a shaft extends through the bore wherein a shaft extends through the bore. This is simply not the case, as in a pending application should be given their broadest reasonable interpretation. In re Pearson, 181 USPQ 641 (CCPA 1974). Francesco does indeed disclose an elongated body (41 in Fig. 6) having a bore (bore inside of 41, in which 12 is inserted into) wherein a shaft (46 in Fig. 6) extends through the bore (the inside of 41 in Fig. 6). Applicant also argues that Francesco does not

Art Unit: 3677

disclose locking members that each vary in thickness, as well as that the locking members extend radially beyond the outer surface of the body in the extended position and are contained within the body at the socket in the retracted position. Again, reading the claims with their broadest reasonable interpretation, one will notice that Francesco does indeed show locking members (24 in Figs. 1-6, as well as 32 in Figs. 1-2 and 5, and 52 in Fig. 6) that by view do indeed vary in thickness; and that the locking members do in fact extend radially beyond the outer surface of the body in the extended position (24 in Figs. 3, as well as from column 1, line 36, “showing the engaging arms in projecting position”) and are contained within the socket in the retracted position (24 in Fig. 4, as well as from column 1, line 39, “showing the engaging arms in retracted position”).

Continuing with the applicant’s argument, applicant argues that 10 is being relied upon as the elongated body, when in fact, part number 41 from Francesco is relied upon as the elongated body; thus enabling the shaft 46 which is partially externally threaded, thus able to be rotatable relative to the body 41. 41 from Francesco is indeed externally threaded as shown by 42 in Fig. 6. Thus presenting a bore (inside of 41 in Fig. 6), wherein a shaft (46) does indeed extend through the bore (inside and protruding out of the bottom of 41), means for allowing a nut (20 in Fig. 1) to be connectable to the body (41) at the partially threaded portion (42).

Since no additional arguments are presented regarding the other claims, the dependent claims (1-10) remain rejected under the same rejections as stated in the previous office action:

***Claim Rejections - 35 USC § 102***

[4] The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

Art Unit: 3677

A person shall be entitled to a patent unless –

(a) the invention was known or used by others in this country, or patented or described in a printed publication in this or a foreign country, before the invention thereof by the applicant for a patent.

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

a. Claim 1. Francesco clearly shows (see figures 1-5 and especially figure 6) and discloses (columns 1-4) an elongated body 41 having an outer surface with an at least partially threaded portion 42, first and second end portions and a central longitudinal bore that is partially threaded, the first end portion of the body 41 having a socket and a plurality of circumferentially spaced apart, radially extending slots 14 that communicate with the socket; a shaft 46 that extends through the bore and having respective first and second end portions communicating with the body end portions, the shaft 46 being partially externally threaded and rotatable relative to the body 41; a plurality of locking members 24 that each vary in thickness (when viewed in at least one direction), the locking members 24 are attached to the first end portion of the shaft 46; the locking members 24 being movable between extended and retracted positions responsive to a rotation of the shaft 46, the locking members 24 extending radially beyond the outer surface of the body 41 and the selected diameter in the extended position (figure 3) and being contained within the body 41 and the socket and inside the selected diameter in the retracted position (see figure 4); and a nut 56 that is connectable to the body 41 at the partially threaded portion.

b. Claim 3. Francesco, as applied above, includes each limitation recited in claim 3 including that the locking members 24 have curved outer surfaces (cylindrical) (see figures 1-6).

Art Unit: 3677

c. Claim 4, Francesco, as applied above, includes each limitation recited in claim 4 including that the body 41 has curved camming surfaces (cylindrical, see figures 3 and 4) at the socket that are positioned to guide movement of the locking members 24 as they travel between the extended and retracted positions (see figures 1-6).

d. Claim 5. Francesco, as applied above, includes each limitation recited in claim 5 including a plate (top surface of the shaft 12 or 46) attached to the shaft 46, the locking members 24 being mounted on the plate (see figures 1-6).

e. Claim 7. Francesco, as applied above, includes each limitation recited in claim 7 including the shaft 46 having a tool receptive portion 34 at one end thereof that enables rotation of the shaft 46 relative to the body 41 (see figures 1,2, and 6; column 2 lines 40-55).

f. Claim 8. Francesco further shows the nut 56 engages the body 41 generally opposite the locking members 24 (see figure 6).

g. Claim 9. Francesco further shows and discloses the shaft 46 moves linearly relative to the central longitudinal axis of the body 41 when the shaft 46 is rotated (see figures 1-6).

h. Claim 10. Francesco clearly shows (see figures 1-5 and especially figure 6) and discloses (columns 1-4) a fastener for joining two members 64 together, each member 64 having an opening 62 therethrough of a selected diameter, comprising an elongated body 41 having an outer surface with an at least partially threaded portion 42, first and second end portions and a central longitudinal bore that is partially threaded, the first end portion of the body 41 having a socket and a plurality of circumferentially spaced apart, radially extending slots 14 that communicate with the socket; a shaft 46 that extends through the bore and having respective first

and second end portions communicating with the body end portions, the shaft 46 being partially externally threaded and rotatable relative to the body 41, the partially externally threaded portion of the shaft 46 engaging the threaded portion of the bore; a plurality of locking members 24 that are attached to the shaft 46 at the first end portion of the body 41, the locking members 24 being attached to a plate (top surface of 12 or 46) mounted to the first end portion of the shaft 41; the locking members 24 being movable between extended and retracted positions responsive to a rotation of the shaft 46, the locking members 24 extending radially beyond the outer surface of the body 41 and the selected diameter in the extended position (figure 3) and being contained within the body 41 at the socket and inside the selected diameter in the retracted position (see figure 4).

*Claim Rejections - 35 USC § 103*

[5] The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

[6] Claims 2 and 6 are rejected under 35 U.S.C. 103(a) as being unpatentable over Francesco, as applied to claims 1 and 5 above.

a. Claim 2. Francesco shows and discloses two locking members 24, but lacks explicit disclosure that there are at least three locking members. It has been held, however, that duplicating the components of a prior art device is obvious within the skill of the art. In re Harza, 274 F.2d 669, 124 USPQ 378 (CCPA 1960). Therefore, it would have been obvious to

one having ordinary skill in the art at the time the invention was made to include more than two locking members so as to provide, for example, greater circumferential stability to the fastener via three or more locking members.

b. Claim 6. Francesco shows and discloses a shaft threaded portion that engages the body 41, but lacks disclosure that the shaft 46 has a first threaded portion that connects with the plate and a second threaded portion that engages the body 41. Effectively then, Francesco lacks disclosure that the plate (top surface of the shaft 46) holding the locking members 24 is separable from the shaft 46. Nevertheless, one-piece construction, in place of separate element fastened together, has been held obvious within the skill of the art. In re Kohno, 391 F.2d 959, 157 USPQ 275 (CCPA 1968); In re Larson, 340 F.2d 965, 144 USPQ 347 (CCPA 1965). Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to make the portion of the shaft carrying the locking members (a plate) separable therefrom and connectable via a threaded portion in order to aid in assembly or disassembly of the fastener in general.

As for the new claims presented (11-20):

### ***Claim Rejections - 35 USC § 102***

[7] The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(a) the invention was known or used by others in this country, or patented or described in a printed publication in this or a foreign country, before the invention thereof by the applicant for a patent.

Art Unit: 3677

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

[8] Claims 11-20 are rejected under 35 U.S.C. 102(b) as clearly anticipated by Francesco, US- 2,597,857, because the invention was patented or described in a printed publication in this or a foreign country, or in public use or on sale in this country more than one (1) year prior to the application for patent in the United States.

Re: Claim 11, Francesco, as applied above and in the preceding office action dated 11/2/2004, includes each limitation recited in Claim 1 (that is, with the absence of, “locking members that each vary in thickness”). Examiner notes no introduction of new claims that refer “locking members are next to and spaced circumferentially around the shaft,” as stated by applicant in amendment 2/2/2005.

Re: Claim 12, Francesco, as applied above and includes each limitation recited in Claim 2.

Re: Claim 13, Francesco, as applied above and includes each limitation recited in Claim 3.

Re: Claim 14, Francesco, as applied above and includes each limitation recited in Claim 4.

Re: Claim 15, Francesco, as applied above and includes each limitation recited in Claim 5.

Re: Claim 16, Francesco, as applied above and includes each limitation recited in Claim  
6.

Re: Claim 17, Francesco, as applied above and includes each limitation recited in Claim  
7.

Re: Claim 18, Francesco, as applied above and includes each limitation recited in Claim  
8.

Re: Claim 19, Francesco, as applied above and includes each limitation recited in Claim  
9.

Re: Claim 20, Francesco, as applied above and includes each limitation recited in Claim  
10.

*Conclusion*

[9] **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.


Art Unit: 3677

[10] Any inquiry concerning this communication or earlier communications from the examiner should be directed to David C. Reese whose telephone number is 703-305-4805. Due to a future move, however, this number will change after the 31st of March. After this date, the examiner can be reached at (571) 272- 7082. The examiner can normally be reached on 7:30 am - 5:00 pm M-Th, and every other Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, J.J. Swann can be reached on (703) 306-4115. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Sincerely,  
David Reese  
Examiner  
Art Unit 3677

  
**ROBERT J. SANDY**  
**PRIMARY EXAMINER**